CLAIM AMENDMENTS

1. (canceled)

2. (currently amended) The method according to claim 10 ~~, characterized in that~~ wherein for regions of the image data with high contrast, a parameter estimation or approximation is carried out.

3. (currently amended) The method according to claim ~~1,~~ ~~characterized in that~~ 2 wherein for the parameter estimation or approximation, the "total least squares" (TLS), "ordinary least squares" (OLS), "Mixed OLS-TLS" and/or variation methods is used.

4. (currently amended) The method according to claim 10 ~~, characterized in that~~ wherein the decay constant c and/or the object shift u is determined by parameter approximation from the image data.

5. (currently amended) The method according to claim 10 ~~, characterized in that~~ wherein the decay constant c is determined by calibration of the camera.

6. (currently amended) The method according to claim 10 ~~, characterized in that the~~ wherein a differential equation (1)

$$\frac{dg(x,y,t)}{dt} = c(x,y,t)g(x,y,t) + q(x,y,t) \Leftrightarrow$$

$$\Leftrightarrow \frac{\partial g}{\partial x}u_x + \frac{\partial g}{\partial y}u_y + \frac{\partial g}{\partial t} - c(x,y,t)g(x,y,t) - q(x,y,t) = 0 \quad \ldots\ldots\ldots\ldots\ldots (1)$$

with
g = the gray value of the image sequence
u = object shift (vector field shift)
c = decay constant
q = source term (light) of interest
is used.

7. (currently amended) The method according to claim ~~1~~, ~~characterized in that~~ 6 wherein known object movements u_x and u_y are introduced directly into the differential equation (1).

8. (currently amended) The method according to claim 10 ~~, characterized in that it is implemented by~~ wherein field programmable gate arrays (FPGA's) are used.

9. (currently amended) A device for digital image processing in CMOS camera images~~, characterized in that~~ wherein it is suitable for carrying out the method according to claim 10.

10. (new) A method of digital image processing in CMOS camera images, the method comprising the steps of:

generating an output signal g from a CMOS camera;

deriving from the output signal g its spatio-temporal gradients (g_x, g_y, g_t);

establishing a time constant c and a local object shift (u_x, u_y) from prior knowledge; and

calculating a target signal value q from the output signal g as $g = (g_x * u_x) + (g_y * u_y) + (g * -1 * c) + g_t$.

11. (new) The method according to claim 11 wherein the target signal value q, the constant c, the x component u_x of the local object shift u, or the u component u_y of the local object shift u is derived by parameter estimation.